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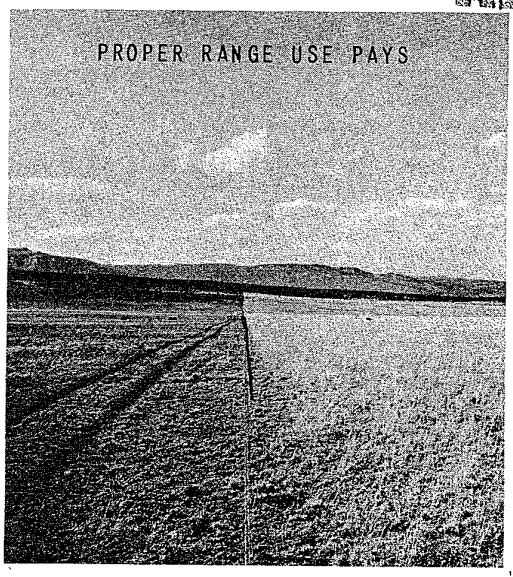
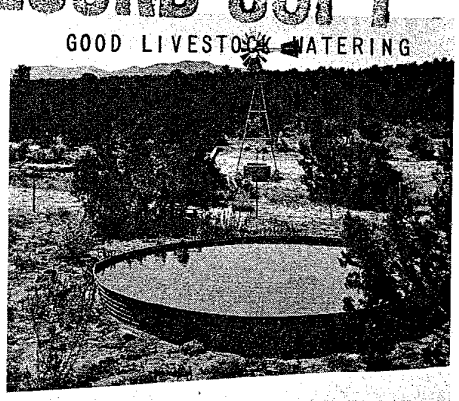
RANGE CONSERVATION - TECHNICAL NOTES





CHOLLA CONTROL

U. S. DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE
NEW MEXICO

Note No. 28 (Rev.)

August 12, 1971

Subject: RANGE - Practice - Brush Control - Brush Infestation Determination by Canopy Cover.

This technical note revises and replaces Range Technical Note No. 28 dated June 26, 1967 on the same subject. All copies of the earlier note should be destroyed.

Brush control specifications use canopy cover as a guide to the degree of infestation of most species. The method described here should be used to determine canopy cover. It should result in a more uniform procedure for determining degree of infestation.

Sometimes degrees of infestation vary within a single pasture and some parts of a pastue may have little or no infestation.

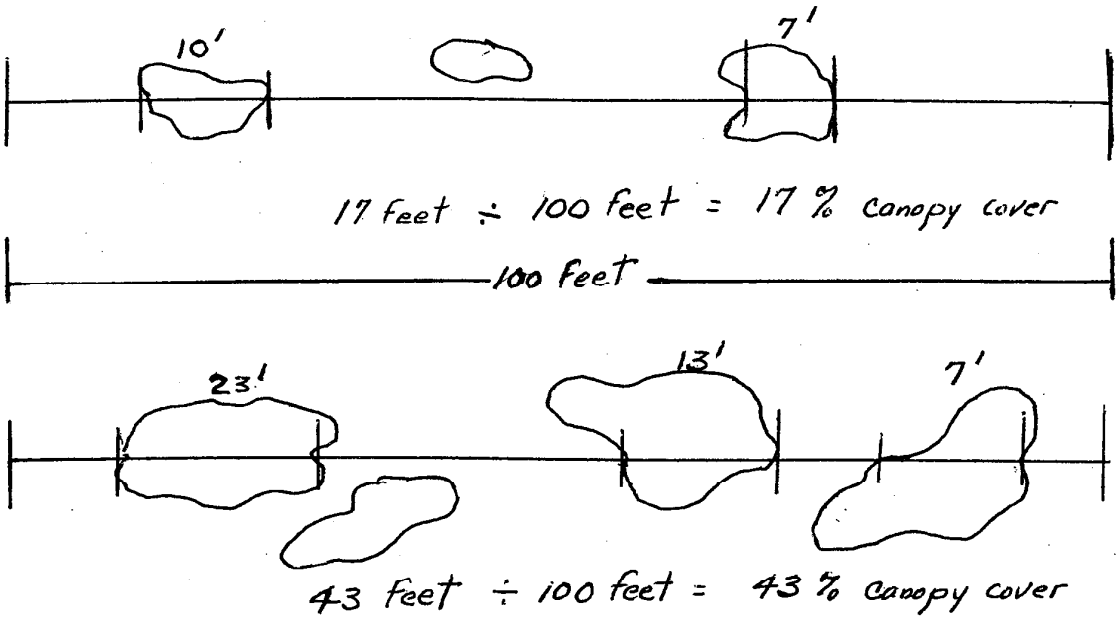
In order to obtain an accurate measure of the amount of each such area, the area should be delineated on an aerial photo based on a visusl judgment of the canopy class to which it belongs. The determination of the canopy cover should then be made within the area delineated. The acres of each canopy class as defined in the Brush Control specifications is measured.

The measurement of the canopy cover should be made by using line intercepts.

AO
Regional Range Conservationist
Area Range Conservationist
Adjoining States: Arizona, Colorado, Texas & Utah

11-64 4-L-19447

Examples:



The number and length of line intercepts will depend upon the size of each delineation. Enough lines should be read in each delineation to adequately represent the degree of infestation.

A complete set of notes should be made and kept in the cooperator's plan folder. The notes should reflect the method used to determine canopy class, the number and length of line intercepts, and the actual measurement. Show by a symbol on the conservation plan map the approximate location of each line intercept.

The percent of canopy cover included in each infestation class of most species has been field tested in Area III. Since there is a difference between areas and because some species are not represented in Area III, each WUC should determine if the canopy cover figures in the revised specifications are adequate. If changes are needed, they should be submitted according to Conservation Planning Memorandum NM-1.

Some of the advantages of using canopy cover to determine infestation are:

1. It is more representative of the competition caused by brush species. (In using numbers of plants, a small, young plant counts as much as a large one.)

2. It is easier and requires less time to determine the infestation of species with many stems, such as mesquite.

3. The degree of control, or reduction in competition, is better reflected by using canopy cover than by plant count. (If a treatment results in a kill of all but a small part of a plant, the canopy method reflects this reduction in competition. The numbers of plants system does not.)